

Notice of Allowability

Application No.

10/632,066

Examiner

Maria Veronica D. Ewald

Applicant(s)

WIEDER, HORST K.

Art Unit

1722

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address--

All claims being allowable, PROSECUTION ON THE MERITS IS (OR REMAINS) CLOSED in this application. If not included herewith (or previously mailed), a Notice of Allowance (PTOL-85) or other appropriate communication will be mailed in due course. **THIS NOTICE OF ALLOWABILITY IS NOT A GRANT OF PATENT RIGHTS.** This application is subject to withdrawal from issue at the initiative of the Office or upon petition by the applicant. See 37 CFR 1.313 and MPEP 1308.

1. ☒ This communication is responsive to 6/30/06.
2. ☒ The allowed claim(s) is/are 1-9, 11 - 29 and 47-49.
3. ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
 - a) ☐ All b) ☐ Some* c) ☐ None of the:
 1. ☐ Certified copies of the priority documents have been received.
 2. ☐ Certified copies of the priority documents have been received in Application No. _____.
 3. ☐ Copies of the certified copies of the priority documents have been received in this national stage application from the International Bureau (PCT Rule 17.2(a)).

* Certified copies not received: _____.

Applicant has THREE MONTHS FROM THE "MAILING DATE" of this communication to file a reply complying with the requirements noted below. Failure to timely comply will result in ABANDONMENT of this application.

THIS THREE-MONTH PERIOD IS NOT EXTENDABLE.

4. ☐ A SUBSTITUTE OATH OR DECLARATION must be submitted. Note the attached EXAMINER'S AMENDMENT or NOTICE OF INFORMAL PATENT APPLICATION (PTO-152) which gives reason(s) why the oath or declaration is deficient.
 5. ☒ CORRECTED DRAWINGS (as "replacement sheets") must be submitted.
 - (a) ☒ including changes required by the Notice of Draftsperson's Patent Drawing Review (PTO-948) attached
 - 1) ☒ hereto or 2) ☐ to Paper No./Mail Date _____.
 - (b) ☐ including changes required by the attached Examiner's Amendment / Comment or in the Office action of Paper No./Mail Date _____.
- Identifying indicia such as the application number (see 37 CFR 1.84(c)) should be written on the drawings in the front (not the back) of each sheet. Replacement sheet(s) should be labeled as such in the header according to 37 CFR 1.121(d).
6. ☐ DEPOSIT OF and/or INFORMATION about the deposit of BIOLOGICAL MATERIAL must be submitted. Note the attached Examiner's comment regarding REQUIREMENT FOR THE DEPOSIT OF BIOLOGICAL MATERIAL.

Attachment(s)

- | | |
|--|--|
| 1. <input type="checkbox"/> Notice of References Cited (PTO-892) | 5. <input type="checkbox"/> Notice of Informal Patent Application |
| 2. <input checked="" type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | 6. <input type="checkbox"/> Interview Summary (PTO-413),
Paper No./Mail Date _____. |
| 3. <input type="checkbox"/> Information Disclosure Statements (PTO/SB/08),
Paper No./Mail Date _____ | 7. <input checked="" type="checkbox"/> Examiner's Amendment/Comment |
| 4. <input type="checkbox"/> Examiner's Comment Regarding Requirement for Deposit
of Biological Material | 8. <input checked="" type="checkbox"/> Examiner's Statement of Reasons for Allowance |
| | 9. <input type="checkbox"/> Other _____. |

EXAMINER'S AMENDMENT

An examiner's amendment to the record appears below. Should the changes and/or additions be unacceptable to applicant, an amendment may be filed as provided by 37 CFR 1.312. To ensure consideration of such an amendment, it MUST be submitted no later than the payment of the issue fee.

Authorization for this examiner's amendment was given in a telephone interview with Atty. Callie Bell on September 8, 2006. The application has been amended as follows:

Claims 30 – 46 and 50 – 55, previously withdrawn are now cancelled.

Allowable Subject Matter

Claims 1 – 9, 11 – 29 and 47 – 49 are allowed. The following is an examiner's statement of reasons for allowance: Applicant has argued in the reply, filed June 30, 2006 that the prior art references of Tsutsumi and Frul, et al. both fail to teach a gas supply system operably coupled to supply the gas at the first pressure to the gas supply tube, and wherein the gas supply system includes at least one gas cooler adapted to cool the supply of gas at the first pressure. Examiner agrees. Tsutsumi teaches an injection mold having one or more portions; a gas supply tube containing a gas at a first pressure; an orifice member having an orifice thereon in thermal communication with at least one portion of the injection mold, a gas exhaust channel containing the gas at a second pressure, but **does not teach a gas supply system which includes at least one gas cooler adapted to cool the supply of gas at the first pressure.**

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The apparatus of Tsutsumi merely has a stream controller which controls the flow of the gas into the mold, but **is not a cooler, cooling the supply of gas at the first pressure.**

With respect to the reference of Frul, et al, Frul, et al. teach a mold cooling apparatus, which utilizes an air/water mixture to cool an injection mold. The air/water mixture is dissipated into the mold via a series of pipes, or supply channels, on which nozzles or orifice members are attached. The air/water mixture drains through a drain channel or exhaust, which surrounds the supply channels. Frul, et al., however do not teach a **gas supply system coupled to supply the gas at the first pressure** to the gas supply tube, wherein the gas supply system includes a **gas cooler adapted to cool the supply of gas at the first pressure.**

Thus, prior art fails to teach an apparatus comprising: an injection mold having one or more portions; a gas supply tube containing a gas at a first pressure; an orifice member having an orifice thereon in thermal communication with at least one portion of the injection mold, wherein the orifice member is operably coupled to receive the gas from the gas supply tube, and wherein the orifice member is adapted to release the gas from the gas supply tube through the orifice; and a gas exhaust channel containing the gas at a second pressure, wherein the gas exhaust channel is operably coupled to receive the gas from the orifice member, and wherein the second pressure is lower than the first pressure; and a gas supply system operably coupled to supply the gas at the first pressure

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to the gas supply tube, and wherein the gas supply system includes at least one gas cooler adapted to cool the supply of gas at the first pressure.

Any comments considered necessary by applicant must be submitted no later than the payment of the issue fee and, to avoid processing delays, should preferably accompany the issue fee. Such submissions should be clearly labeled "Comments on Statement of Reasons for Allowance."

Drawings

The drawings filed on July 31, 2003 are acceptable subject to correction of the informalities indicated on the attached "Notice of Draftsperson's Patent Drawing Review," PTO-948. In order to avoid abandonment of this application, correction is required in reply to the Office action. The correction will not be held in abeyance.

Conclusion


Any inquiry concerning this communication or earlier communications from the examiner should be directed to Maria Veronica D. Ewald whose telephone number is 571-272-8519. The examiner can normally be reached on M-F, 8 - 4:30.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Dr. Yogendra Gupta can be reached on 571-272-1316. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

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Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

MVE


JOSEPH S. DEL SOLE
PRIMARY EXAMINER
9/13/06